


UNITED STATES ENVIRONMENTAL PROTECTION AGENCY
REGION 2

DATE: JUL 12 2012

SUBJECT: Request for Authorization to Conduct a CERCLA Non-Time-Critical Removal Action at the Universal Oil Products Site, East Rutherford, Bergen County, New Jersey

FROM: Carole Petersen, Chief
New Jersey Remediation Branch 

TO: Walter E. Mugdan, Director
Emergency and Remedial Response Division

Site ID # NJD002005106

I. PURPOSE

The purpose of this action memo is to request approval to conduct a non-time-critical removal action for the Universal Oil Products (UOP) site located in East Rutherford, Bergen County, New Jersey (see Figure 1).

The goal of this removal action is to remove sediment and soil that is highly contaminated with PCBs, mercury and chromium from a waterway adjacent to a former waste water lagoon, as well as the lagoon bottom and berms, in order to prevent redistribution of the contamination and to reduce potential adverse human health and ecological risk.

This work will be undertaken by Honeywell International, Inc. under an Administrative Settlement Agreement and Order on Consent that was signed on September 27, 2010 (Settlement Agreement). The Settlement Agreement also included provisions to complete the Remedial Investigation and Feasibility Study (RI/FS) for Operable Unit 2 (OU2), also referred to as the streamlands portion of the site. The removal action will occur within the OU2 portion of the site.

An Engineering Evaluation/Cost Analysis (EE/CA) was submitted to EPA by Honeywell. The EE/CA and a fact sheet describing the proposed removal action were released to the public on February 29, 2012 and on March 6, 2012, a public meeting was held in East Rutherford to discuss the proposed response action and EE/CA, and to receive public comment.

Conditions at the site meet the criteria for a removal action under the Comprehensive Environmental Response, Compensation and Liability Act (CERCLA), as documented in Section 300.415(b)(2) of the National Oil and Hazardous Substances Pollution Contingency Plan (NCP), 40 CFR Part 300.

The New Jersey Department of Environmental Protection (NJDEP) was consulted on the Proposed Plan and agrees with the selected removal action for this site.

II. SITE CONDITIONS AND BACKGROUND

This Action Memorandum documents the proposed non-time-critical removal action for the Universal Oil Products site. The Comprehensive Environmental Response, Compensation and Liability Information System ID number for the site is NJD002005106.

A. Site Description

1. Removal site evaluation

During the data collections for the RI/FS for OU2, the streamlands portion of the UOP site, it became evident that there are high concentrations of contaminants in the vicinity of the previous waste water lagoon. EPA was in the process of taking the lead for oversight from NJDEP, while data were being collected for the OU2 RI/FS. Therefore, provisions to conduct an EE/CA for the area of highly contaminated sediments were included in the Settlement Agreement, signed on September 27, 2010. The final draft of the EE/CA was sent to EPA on January 12, 2012.

2. Physical location

The UOP site is located in the Borough of East Rutherford, Bergen County, New Jersey. As depicted in Figure 1, the property is surrounded by tidal marshes, highways, and commercial and light-industrial properties. Berry's Creek and tidal marshes are east of the UOP site, and Ackerman's Creek and commercial properties are to the south. The UOP site encompasses approximately 74 acres, which are divided into OU1 - the uplands, and OU2 - the streamlands. The uplands on the site are the result of fill material placed upon the native peat which lies over a thick glacial clay. The OU2 portion of the site consists of tidal wetlands, open waterways and the previous waste water lagoon. The site is further divided into six areas based on historic use. OU1 includes Areas 1, 1A, 2 and 5, and OU2 consists of Areas 3 and 4. In addition, the site is physically split roughly into thirds by the New Jersey Transit Pascack Valley commuter rail line and by Murray Hill Parkway.

3. Site characteristics

The UOP site was initially developed in 1932 by Trubeck Laboratories, which built and operated an aroma chemicals laboratory and later a solvent recovery operation. UOP, a division of the Signal Companies, acquired the property and facilities in 1960. A wastewater treatment plant and two wastewater lagoons ceased operation in 1971. All operations at the facility were terminated in 1979, and the buildings were demolished in 1980. In 1986, Allied Corporation merged with the Signal Companies, forming AlliedSignal. As part of the merger, AlliedSignal acquired the UOP property. In 1999, Honeywell merged with AlliedSignal. The property (with the exception of the 17 acres west of the Pascack Valley rail line) was sold to the New Jersey Sports and Exhibition Authority (NJSEA) in December 2006. The portion of the site west of the NJ Transit Pascack Valley Line has been cleaned and redeveloped including the construction of several commercial businesses.

Various investigations conducted between 1983 and 2010 indicate that the UOP site has been contaminated by historical operations on the UOP property as well as from releases that occurred on nearby facilities. Soil, groundwater, sediment, and surface water have been contaminated by volatile organic compounds (VOCs), semivolatile organic compounds (SVOCs), polychlorinated biphenyls (PCBs), and metals. Multiple remedial actions have been completed within the OU1 area to address portions of the contaminated media. All components of the remedy selected for OU1 (in a September 1993 Record of Decision) have been implemented.

The primary medium affected in the streamlands (OU2) is sediment, and there are multiple chemicals of concern in these areas. PCBs, chromium, and mercury have generally been identified as the most prevalent chemicals of concern (COCs) present in sediment at elevated concentrations. Honeywell is currently conducting an RI/FS for OU2, which began in 2005. Sampling during the RI/FS found that the levels of contamination in the vicinity of the former waste water lagoon are substantially higher than the rest of the site and have the potential to migrate. The berms of the lagoon also contain high concentrations of COCs. In response to this threat, EPA and Honeywell agreed to address the contamination in the vicinity of the lagoon through this NTCRA.

4. Release or threatened release into the environment of a hazardous substance, or pollutant or contaminant

The NTCRA focuses on addressing soft sediment contamination within the lagoon and stream channels located in the northwest portion of the UOP site, based on the relatively higher concentration of contaminants of concern in these areas. In the NTCRA area, concentrations were found to be as high as 5,810 mg/kg of PCBs, 643 mg/kg of mercury and 49,800 mg/kg of chromium; and the overall levels of contamination exceeded screening levels by several orders of magnitude. While the primary sources of COCs (former UOP operations and off-site sources)

have been eliminated, the soft sediments are a potential secondary source of COCs to other areas of the site.

Preliminary human health and ecological risk assessment calculations prepared as part of the OU2 RI/FS were evaluated in consideration of the NTCRA. Exposure Point Concentrations (EPCs), which are the concentrations of contaminants to which people or organisms are exposed, were calculated from samples in the channels in the western portion of the site, as well as for the berms. Risk calculations for dermal contact resulted in an excess lifetime cancer risk that exceeds EPA's acceptable risk range of 1×10^{-4} to 1×10^{-6} , and Hazard Index (HI) threshold of 1.0. Ecological Hazard Quotients (HQs) were also considerably greater than the acceptable screening levels.

For the NTCRA Area sediments, the draft human health risk assessment for OU2 calculated RME exposure point concentrations for the 0 to 6-inch layer. For Total Aroclors, the EPC is 140 mg/kg. For mercury, the EPC is 640 mg/kg, and for chromium, the EPC is 50,000 mg/kg. Excess lifetime cancer risks (ELCR) for the older child trespasser exposure pathway is 1×10^{-4} , just within the acceptable range of the EPA target values.

For the northern and western berms to the lagoon, the risk assessment calculated: The 95% Upper Confidence Level (UCL) for Aroclor 1248 RME is 1,983 mg/kg. The 95% UCL for mercury is 31.84 mg/kg. Excess lifetime cancer risks (ELCR) and/or the Hazard Index (HI) exceed EPA target values of 1×10^{-4} to 1×10^{-6} or HI of 1 for the trespasser dermal contact (older child and adult) exposure pathways. These contaminants, along with chromium, also exceed ecological risk screening criteria. Among the depths evaluated, the maximum ecological HQs ranged from 329 to 1,062 for Aroclor 1248, from 93 to 301 for total PCBs, from 187 to 428 for chromium, and from 17 to 99 for mercury.

5. NPL Status

The Universal Oil Products site was placed on the National Priorities List (NPL) in 1983.

6. Maps, pictures and other graphic representations

Figure 1 provides a map of the site with the delineation of the operable unit areas, as well as the area of this planned removal action. Appendix A provides figures with concentrations of PCBs, mercury and chromium from cores taken within the NTCRA area.

B. Other Actions to Date

1. Previous actions

The NTCRA is occurring on the OU2 portion of the property. Several actions have been implemented previously in this area. In 1990, the contents of the wastewater lagoons, including the dividing wall between them, were removed under an interim remedial measure (IRM), and transported off site for disposal. The IRM, which is similar to a NTCRA, was implemented by the potentially responsible party pursuant to a 1986 administrative consent order with the NJDEP.

In 2007, another IRM was conducted, this time within the footprint of the planned Meadowlands rail line, as that area would no longer be accessible for remediation after completion of the rail line construction. Sediment contamination was addressed by removing soil and sediment from within the proposed railroad footprint. This was implemented by contractors for the New Jersey Sports and Exhibition Authority (NJSEA) with NJDEP oversight. In the wetland areas, four feet of sediment were removed. Within the lagoon and tidal ditches sediment was excavated to a depth of two feet below the proposed final grade. The rail line is now operational.

In addition, in 2007, NJ Transit conducted a soil removal along the Pascack Valley Line to address UOP site-related PCB contamination in that area.

In addition, the remedial action for OU1, as described in a September 1993 Record of Decision (ROD) for the site, a December 1998 ROD Amendment, and an April 1999 Explanation of Significant Differences (ESD) has been implemented. A portion of the work selected in the 1993 ROD included excavation of contaminated soil and treatment with thermal desorption. There were problems with implementation of the thermal desorption remedy, so the treated soils that still had contaminant concentrations above the treatment goal were disposed of on site, along with lead-contaminated soils and a multilayer cap was placed over this material. For the remaining PCB/PAH contaminated soils, the ROD Amendment changed the remedy to off-site disposal (at either TSCA or RCRA Subtitle D facilities, based on the PCB concentrations). The remaining VOC-contaminated soils were treated with thermally enhanced vapor extraction, as per the ESD. Approximately seven million gallons of shallow ground water was extracted, treated and discharged on site. In addition, during redevelopment of the area west of the Pascack Valley Rail Line, additional soil removal with off-site disposal occurred. The actions conducted for OU1 are on a different portion of the property than the NTCRA.

2. Current actions

The RI/FS for OU2 of the UOP site is ongoing. The area under investigation for the UOP site OU2 is also part of the Berry's Creek study area, which also has an ongoing RI/FS.

Berry's Creek is located on the eastern border of the site, and has received contamination from the UOP site as well as from other hazardous waste sites in the vicinity. Movement of contamination between the UOP site and Berry's Creek can occur through tidal action. Creek

sediments are contaminated with mercury, PCBs and other chemicals. Fish and crabs in Berry's Creek and adjacent water bodies have been found to be contaminated with chemicals at levels that exceed U.S. Food and Drug Administration guidelines for human consumption. NJDEP consumption advisories are in place for several species of fish and for crabs.

The RI/FSs for both UOP OU2 and Berry's Creek will be important with respect to addressing overall contamination concerns in the NTCRA area. This removal action expedites remediation in a portion of the site, but does not address all risk pathways at this time.

C. State and Local Authorities' Roles

NJDEP was the lead agency for the site until July 2008. After EPA took the lead role, NJDEP has maintained active involvement in the site. NJDEP has been reviewing materials relating to the site, as well as this removal action in its capacity as a support agency. The New Jersey Meadowlands Commission (NJMC) and the Borough of East Rutherford also have participated in meetings with respect to the site.

The NJSEA is the owner of the property on which this removal action will occur, although Honeywell is financing the response actions.

III. THREATS TO PUBLIC HEALTH OR WELFARE OR THE ENVIRONMENT, AND STATUTORY AND REGULATORY AUTHORITIES

The presence of hazardous substances, pollutants, and contaminants at the site presents an unacceptable potential risk to public health, welfare, or the environment. EPA has identified conditions in the sediments in the area of the waste water lagoon at the UOP site that correspond to factors identified in Section 300.415(b)(2) of the NCP, which indicate that a removal action is necessary. Site conditions that correspond to factors which provide a basis for a removal action under Section 300.415 (b)(2) of the NCP include:

- Actual or potential exposure to nearby human populations, animals, or the food chain from hazardous substances or pollutants or contaminants.*

As part of the OU2 RI/FS, an HHRA has been drafted for the site. The NTCRA area is evaluated separately in the HHRA using data available from the RI/FS and additional data collected to support the NTCRA. The potential receptors quantitatively evaluated in the HHRA for the NTCRA area were current and future trespassers. Older child (6 to 18 years old) and adult trespassers may occasionally use the site for limited recreational purposes and have direct contact with site sediment and surface water. Potential trespassers were evaluated for ingestion, dermal contact, and inhalation exposures to sediment (0 to 6 inches) within the NTCRA area and ingestion and dermal contact exposures to surface water within the NTCRA area.

Cumulative exposure to sediment in the NTCRA area for the older child is 1×10^{-4} excess lifetime cancer risks (ELCR), which is just within the acceptable risk range, but two target-organ-specific Hazard Indexes (HIs) (eyes and finger nails) are greater than 1, exceeding the acceptable hazard index.

For the northern and western berm areas, the risk assessment calculated ELCRs and/or HIs that exceed the EPA target values of 1×10^{-4} to 1×10^{-6} or HI of 1 for the trespasser dermal contact (older child and adult) exposure pathways. The ELCR for Aroclor 1248 is 9×10^{-3} . The HI for mercury is 1.4.

With respect to ecological risk, bioassay results in the NTCRA area sediments indicated high risk to benthic receptors.

In the northern and western berms, PCBs, mercury and chromium also exceed ecological risk screening criteria. Among the depth intervals evaluated, the maximum ecological HQs ranged from 329 to 1,062 for Aroclor 1248, from 93 to 301 for total PCBs, from 187 to 428 for chromium, and from 17 to 99 for mercury.

– Actual or potential contamination of drinking water supplies or sensitive ecosystems.

The NTCRA area is primarily within stream channels and wetlands. Aquatic biota, waterfowl and several species of mammals have complete exposure pathways with the contamination in the sediments.

– High levels of hazardous substances or pollutants or contaminants in soils largely at or near the surface that may migrate.

The soft sediments of the UOP site contain very high concentrations of contaminants, which have not migrated far from the lagoon that had previously been part of the waste water treatment at the facility. Such material reflects a previous release, which is still able to be addressed prior to complete dispersal. For the NTCRA Area sediments, the draft HHRA for OU2 calculated RME exposure point concentrations (EPC) for the 0 to 6-inch layer. For Total PCB Aroclors, the EPC is 140 mg/kg. For mercury, the EPC is 640 mg/kg, and for chromium, the EPC is 50,000 mg/kg. For the northern and western berm areas, the 95% UCL for Aroclor 1248 RME is 1,983 mg/kg. The 95% UCL for mercury is 31.84 mg/kg.

– Weather conditions that may cause hazardous substances or pollutants or contaminants to migrate or be released.

The areal extent of this response action was defined to address high levels of contamination in the lagoon berms and the soft sediments in the lagoon and the adjacent channels, which have the

potential to migrate to other areas. Increasing intensity of storm events could cause contamination to migrate to other nearby areas.

IV. ENDANGERMENT DETERMINATION

Actual or threatened releases of hazardous substances from this site may present an imminent and substantial endangerment to public health, or welfare, or the environment.

V. PROPOSED ACTIONS AND ESTIMATED COSTS

A NTCRA is proposed to mitigate, minimize, or eliminate the potential threats to human health, welfare, or the environment from high concentrations of PCBs, mercury and chromium and other hazardous substances found in soft sediments in the vicinity of the previous waste water lagoon at the UOP site. The removal action is considered non-time critical because, although there is a potential threat to public health, welfare, or the environment, there is sufficient planning time available before the removal action must be initiated.

The removal action objectives (RAOs) for the NTCRA at the UOP site are as follows:

- Remove source areas in the northwest portion of OU2 to prevent or minimize migration of contaminated sediment from the lagoons and adjacent stream channels to downstream portions of OU2. (See Figures 2-6a through 2-6g in Appendix A, which show the areas to be removed and the contaminant concentrations).
- Reduce potential risk to human and ecological receptors due to contaminated sediment and soil in the lagoon, lagoon berms, and adjacent stream channels.

A. Proposed Actions

1. Proposed action description

Dewatering

The EE/CA evaluated the appropriate methods to remove the sediment from the NTCRA area and determined that it would be most effective to excavate the material after draining the waterways, rather than dredging them. Several steps will be taken during mobilization in order to drain the waterways between Murray Hill Parkway and the Pascack Valley Rail Line. First, a tide gate will be installed on Ackerman's Creek at the east side of the conduit under Murray Hill Parkway. This will allow drainage from the construction area, but will not allow for tidal inundation. Temporary plastic piping will be installed within the channels to allow storm water flows to bypass the channels. Flow will be by gravity. The lagoon water, which is relatively clean, will be pumped directly to Ackerman's Creek until approximately one foot of water is left

in the lagoon. At that point, when there is potential that the dewatering process may resuspend contaminated sediment in the lagoon water, the water will be pumped to a temporary water treatment facility that will be assembled on site. The treated water will be discharged on site, to Ackerman's Creek, but outside of the NTCRA area. Normal gravity flow will allow this water to drain through the tide gate to the east side of Murray Hill Parkway and to Berry's Creek.

Excavation

The soft sediment in the stream channels near the lagoon, the berms to the lagoon, and lagoon bottom will be excavated by amphibious backhoes and bulldozers. A relatively small area between the northern channel and the northern berm will also be removed, because it would be difficult to access that material after completion of the removal action. Approximately 27,000 yards of material and debris will be excavated. The excavated material will be transported by truck and stockpiled on a soil/sediment containment pad. Care will be taken to prevent contaminant distribution between the excavation and the pad (e.g., wheel wash).

Cleanup numbers were not developed for this NTCRA. In areas where excavation will occur, the sediment will be removed to the underlying clay layer, which typically will require excavation of approximately four feet of soil/sediment. The clay has been shown to be clean in most samples and has been demonstrated to be a boundary to downward migration of contamination. No excavation into the clay is anticipated. It is likely that the few occurrences of contamination in the clay were the result of mixing with overlying contamination during sampling. Post-excavation sampling will be conducted to document any residual concentrations following the cleanup.

The areal extent of this response action was defined to address high levels of contamination in the lagoon berms and the soft sediments in the lagoon and the adjacent channels, which have the potential to migrate to other areas. Channels beyond the footprint planned for remediation were not included because they contain COC concentrations similar to the COC concentrations for the rest of the site. Cleanup numbers for the site will be determined through the RI/FS process for OU2, which will address the remaining contamination at the site.

The lagoon berms will not be replaced and the area of the lagoon will be left as open water.

Disposal

After the sediment/soil has been dewatered and analyzed, it will be shipped off site for disposal. Transportation off site will be by truck. If required, additives will be used to ensure that the material meets transportation requirements with respect to water content.

Based on pre-excavation PCB data, a portion of the material will need to be handled in accordance with the Toxic Substances Control Act (TSCA) and disposed of at a TSCA-permitted

landfill. Other material will be tested to determine whether it meets RCRA requirements for disposal and, based on analytical testing, will be sent to a hazardous waste disposal facility or a sanitary landfill. EPA will ensure that all disposal facilities receiving waste are in compliance with their permit conditions prior to shipping.

Fill

One foot of fill will be added to provide a suitable substrate for biota and will help ensure that biota will not come into contact with any residual contamination that may remain in the remediation footprint.

Although this response action occurs within a wetlands area, it was determined through discussions with the Biological and Technical Advisory Group (BTAG) that the creation of more open water in this area may enhance wetlands habitat, and has the potential to offset any required wetlands mitigation.

Institutional Controls

No institutional controls (ICs) are included in this removal action. If ICs are necessary, they will be evaluated and determined as part of the RI/FS and ROD for the OU2 portion of the site.

2. Contribution to remedial performance

The removal of the highly contaminated material from the vicinity of the previous waste water lagoons expedites the cleanup of the site, by addressing the most contaminated material first. The ROD for OU2 will then have to consider appropriate actions to address the remaining contamination, which would have relatively lower concentrations (and generally less risk). Remedial alternatives for the OU2 RI/FS have not yet been selected.

While both of the active response actions proposed in the EE/CA (capping and removal) would not be inconsistent with the final remedy for OU2, it is possible that if the EE/CA had identified capping instead of removal as the preferred alternative, that some portion of the capped material would require a different remedy in the ROD. For instance, it is possible that some of the material targeted to be addressed in the EE/CA would be considered principal threat waste if it remained on site for the ROD. Such material would need to be addressed again at that time at additional costs. This will not be an issue with the selected removal alternative.

3. Engineering Evaluation/Cost Analysis (EE/CA)

Because of the availability of a planning and design period of at least six months prior to the commencement of removal action activities at the site, an EE/CA was prepared to analyze

various removal alternatives. The EE/CA was prepared in conformance with the guidelines in Guidance on Conducting Non-Time-Critical Removal Actions under CERCLA (EPA/450-R-93-057, August 1993). The EE/CA is included in the Administrative Record for the site.

The EE/CA and the NTCRA Fact Sheet, which identified the preferred response action, were made available to the public on February 29, 2012 and a notice of availability of these documents was published in *The Bergen Record*. On March 6, 2012 a public meeting was held at the East Rutherford Memorial Library, in East Rutherford, New Jersey to present the findings of the EE/CA, discuss the preferred alternative, and answer questions about the response actions under consideration. Public comments were accepted at this meeting and in writing through March 30, 2012. Public comments have been addressed in the Responsiveness Summary attached to this Action Memorandum as Appendix B.

4. Applicable or relevant and appropriate requirements (ARARs)

Applicable or Relevant and Appropriate Requirements (ARARs) that are within the scope of this removal action will be complied with to the extent practicable, considering the exigencies of the situation. Potential federal and state ARARs for this removal action are listed below and are described in the EE/CA. Additional ARARs may be identified as details of the project are developed.

Federal

- Sections 401, 402, and 404 of the Clean Water Act (CWA)
- Toxic Substances Control Act (40 CFR Part 761.60)
- Section 10 of the Rivers and Harbors Appropriation Act
- Fish and Wildlife Coordination Act
- Hazardous Materials Transportation Act
- Resource Conservation and Recovery Act (Subtitles C and D)
- Land Disposal Restrictions (40 CFR 268)
- Section 122 of the Clean Air Act
- Section 307 of Federal Coastal Zone Management Act

State (substantive requirements only)

- New Jersey Technical Requirements for Site Remediation
- New Jersey Soil Erosion and Sediment Control Act
- New Jersey Surface Water Quality Standards developed pursuant to the CWA, New Jersey Water Pollution Control Act and New Jersey Water Quality Planning Act
- Tidelands Act
- Waterfront Development Law
- Flood Hazard Area Control Act
- Wetlands Act of 1970 (N.J.S.A. 13:9A-1)

- New Jersey Solid Waste Management Act
- New Jersey Water Pollution Control Act – NJPDES Rules

5. Project schedule

Site preparations will take approximately one month after mobilization. Excavation of the contaminated material will take approximately 4 to 5 months. Final transport of excavated material and demobilization will likely take another month. The overall time frame should be approximately 6 to 7 months. Honeywell is planning to mobilize during early summer 2012.

B. Estimated Costs

Honeywell will be conducting the removal action and is responsible for reimbursing EPA's oversight costs. The construction costs with the present worth operation and maintenance costs are estimated to be \$16.1 million. This estimate is within the range of -30 to +50 percent. This means the actual costs could range between \$11.2 million and \$24.1 million.

The costs for this NTCRA exceed \$6 million. Accordingly, consultation with the Director of the Office of Superfund Remediation and Technology Innovation (OSRTI) is required during the preparation of the EE/CA Approval Memo, according to the guidance, "Use of Non-Time-Critical Removal Authority in Superfund Response Actions." Given that the Settlement Agreement and Administrative Order on Consent required Honeywell to prepare the EE/CA, the Region did not prepare an EE/CA Approval Memo. The Region informed OSRTI of this change in process when it responded to comments prepared by the OSRTI Sediments team regarding the NTCRA Fact Sheet. Based on the information provided, OSRTI waived the consultation process for this NTCRA.

VI. EXPECTED CHANGE IN THE SITUATION SHOULD ACTION BE DELAYED OR NOT TAKEN

Should the response action be delayed or not taken, high levels of PCBs, mercury and chromium present in soft surficial sediments in the vicinity of the previous waste water lagoon at the Universal Oil Products site, could be redistributed to other parts of the site as well as to Berry's Creek, further endangering public health and the environment.

VII. OUTSTANDING POLICY ISSUES

None.

VIII. ENFORCEMENT

In September 2010, Honeywell entered into a Settlement Agreement and Administrative Order on Consent to complete the RI/FS for OU2 of the UOP site, and to perform a removal action. The work described within this Action Memorandum is based on the EE/CA prepared by Honeywell. Under the Settlement Agreement, Honeywell is obliged to implement the removal action selected in this Action Memorandum.

IX. RECOMMENDATION

Conditions at the site meet the NCP Section 300.415(b)(2) criteria for a removal action.

This decision document, which selects the NTCRA for the Universal Oil Products site, was developed in accordance with CERCLA, and is not inconsistent with the NCP. The decision documented in this Action Memorandum is based on the Administrative Record for the site.

The NJDEP was consulted regarding the proposed actions and agrees with the selected removal action for the site.

Please indicate your approval of the proposed response action by signing below.

Approve: John S. Frisco Date: 7/12/12
for Walter E. Mudgan
Director, Emergency and Remedial Response Division

Disapprove: _____ Date: _____
Walter E. Mudgan
Director, Emergency and Remedial Response Division








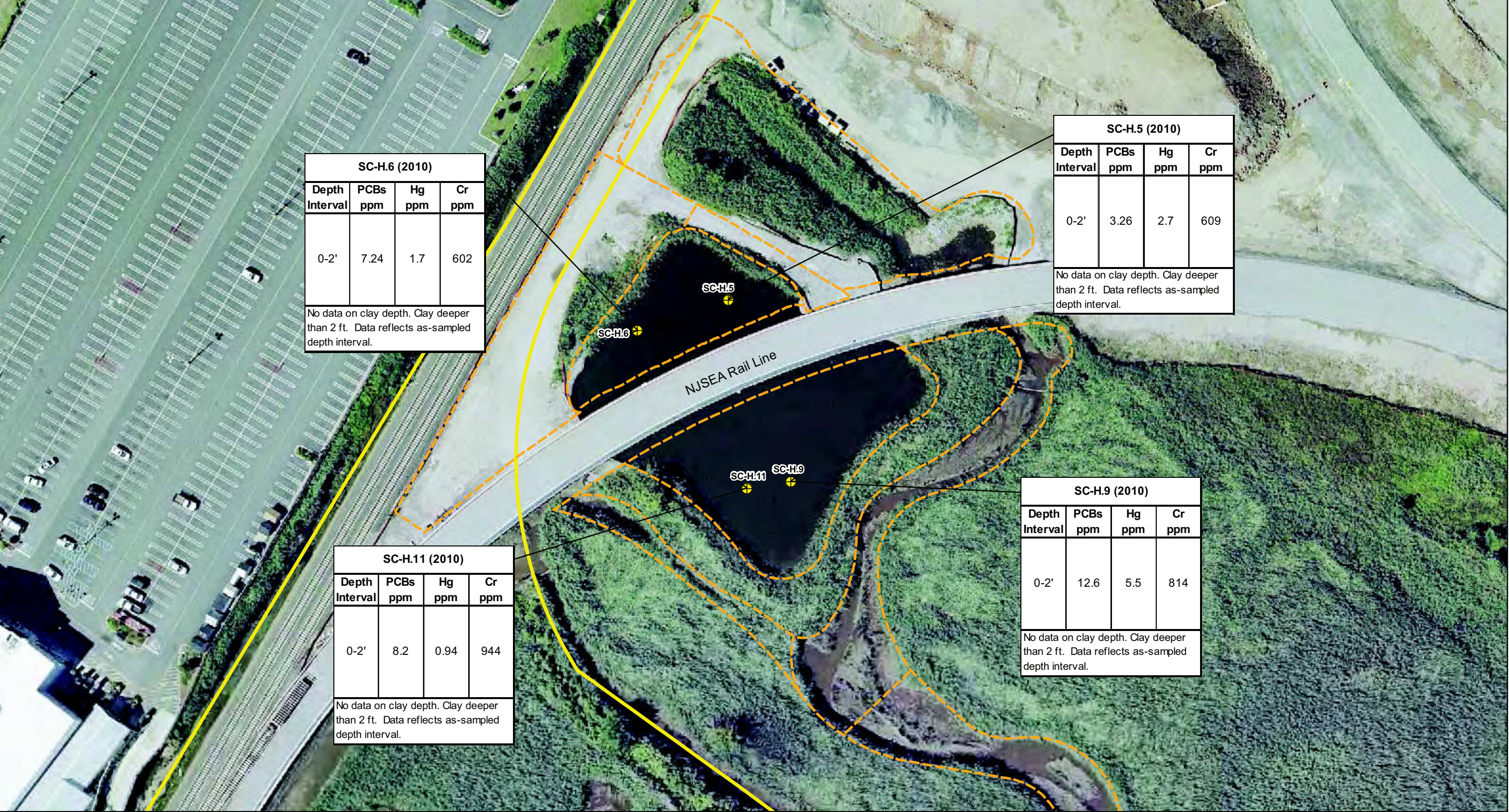
-  Proposed Remediation Areas
-  Functional Area
-  Operable Unit 1 - Uplands
-  Operable Unit 2 - Streamlands
-  UOP Site Boundary

Figure 1

Appendix A



- Legend**
- ⊕ Previous Investigation Sediment Sample Location
 - Future Remediation Areas
 - UOP Site Boundary

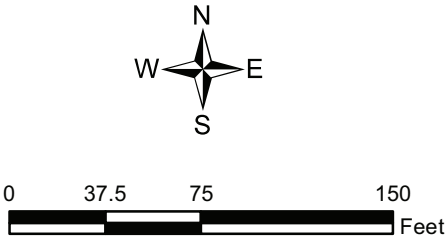
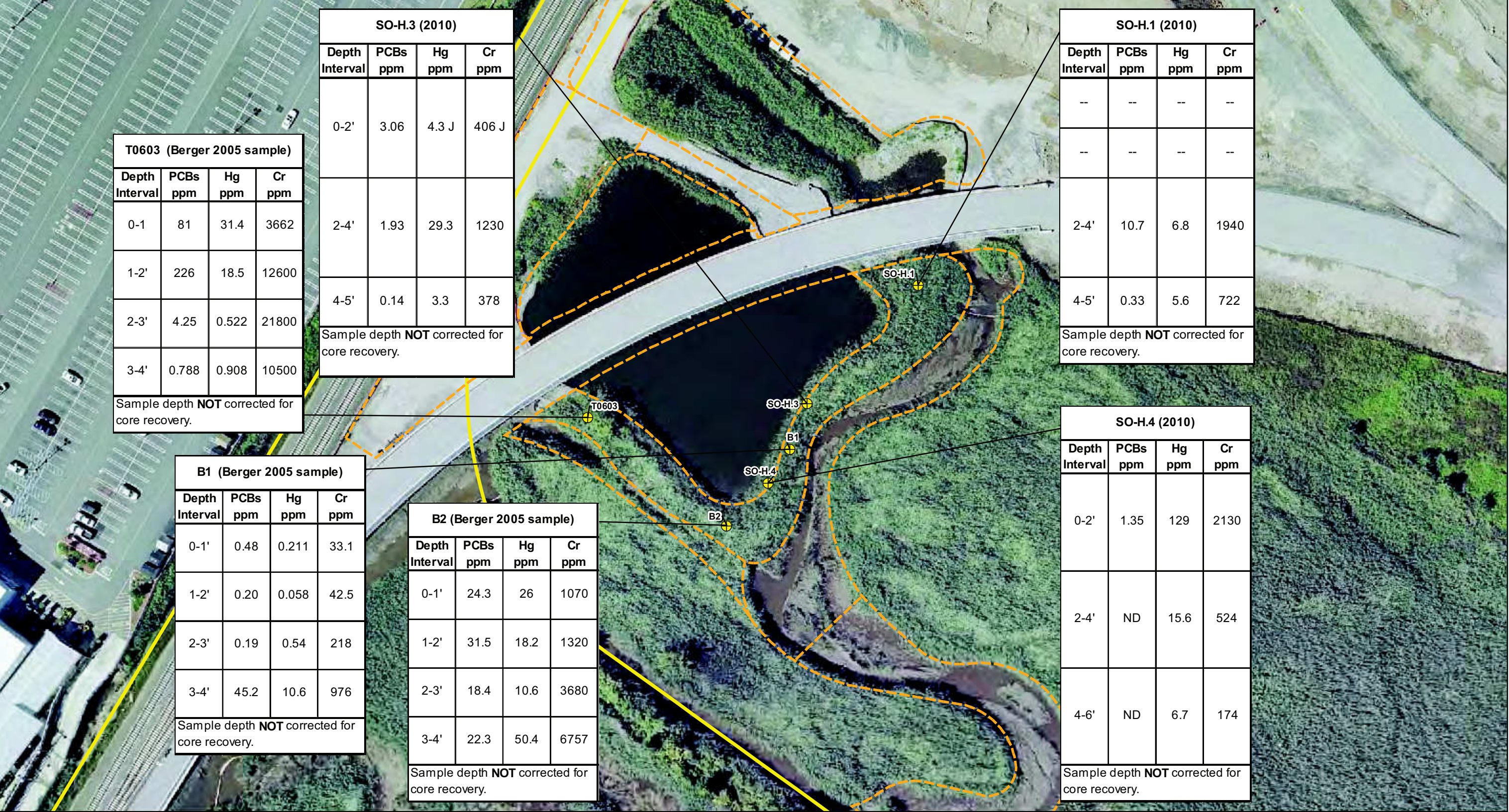


Figure 2-6a
Total PCB, Chromium, and Mercury Concentrations – Lagoon
Pre-Design Sampling Locations
Engineering Evaluation/Cost Analysis
Non Time Critical Removal Action of
Lagoon and Adjacent Stream Channels
Universal Oil Products
East Rutherford, N.J.



Legend

- ⊕ Previous Investigation Sediment Sample Location
- Future Remediation Areas
- UOP Site Boundary

Note:

- 1. ND = non detect
- 2. "--" = not sampled
- 3. "J" – estimated value

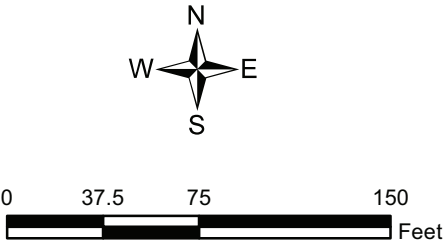
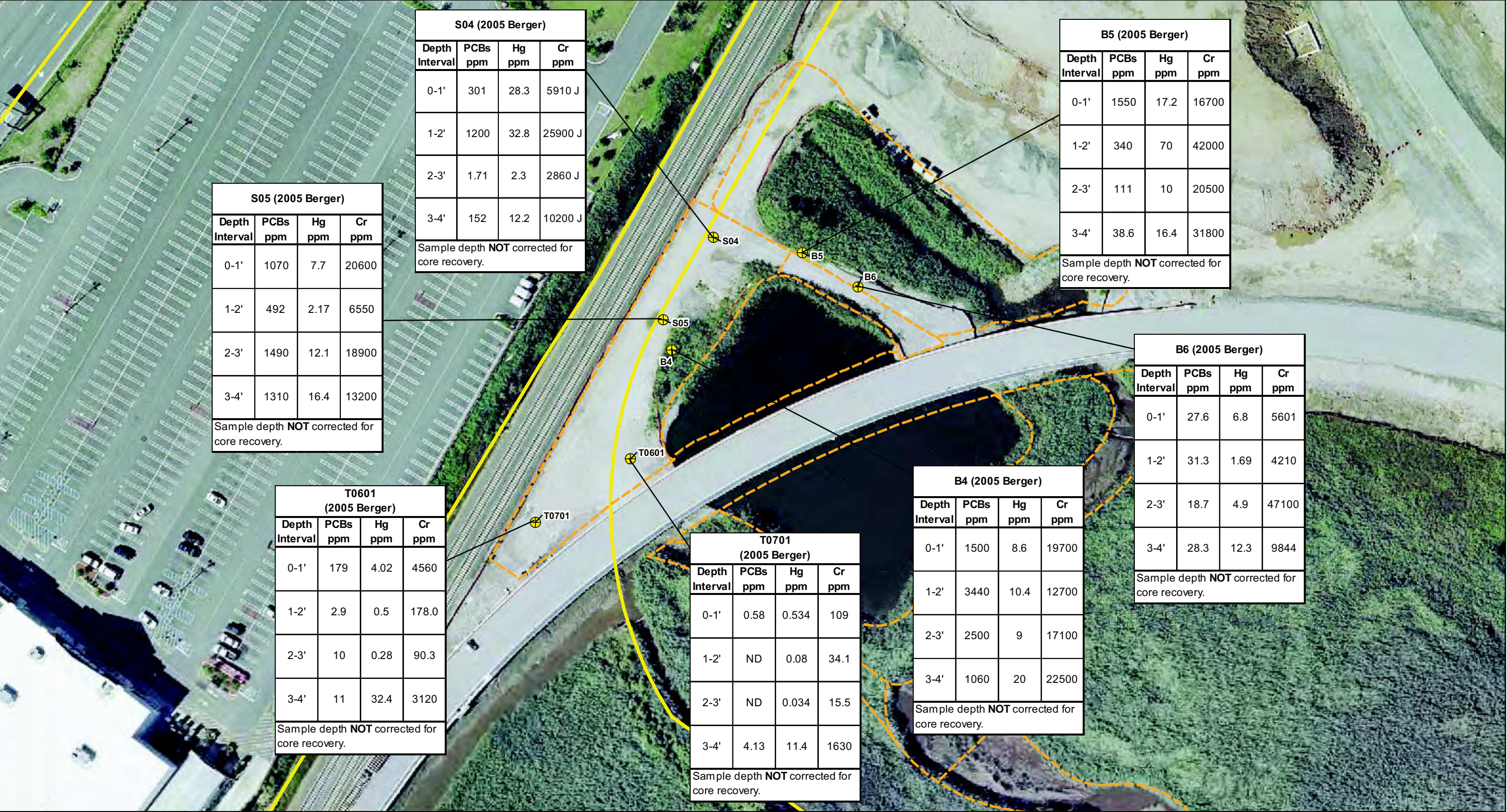
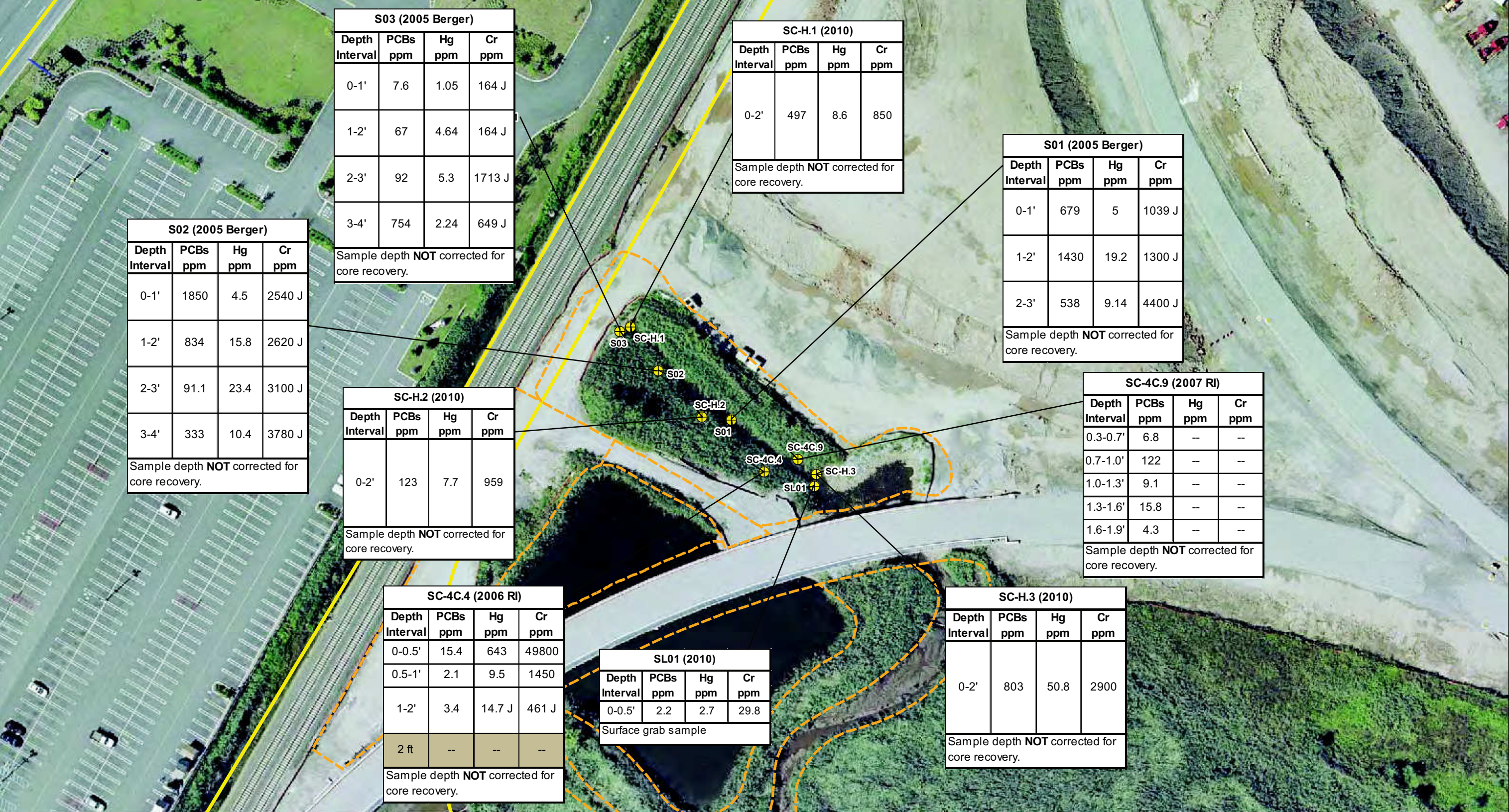
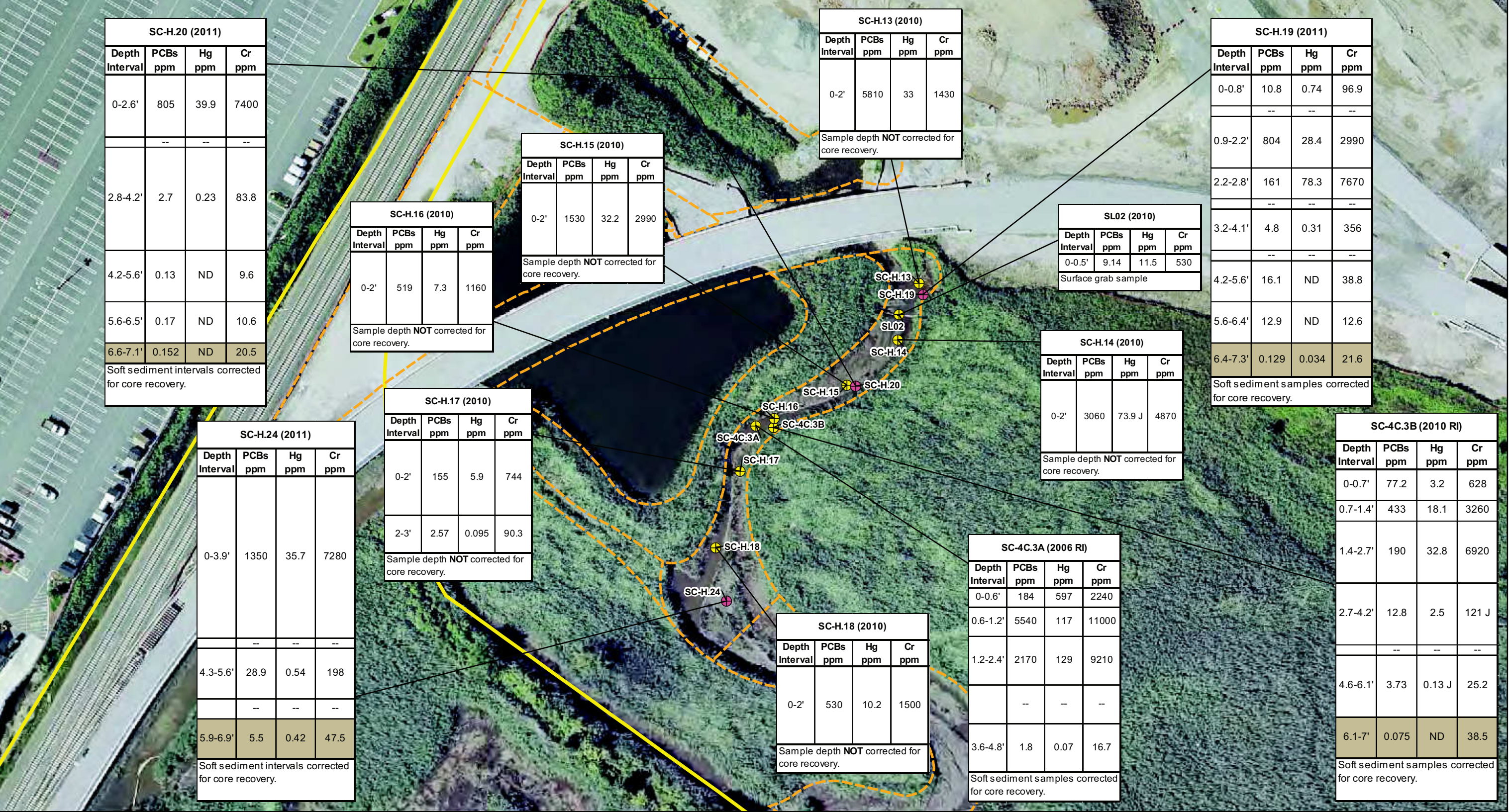


Figure 2-6b
Total PCB, Chromium, and Mercury Concentrations – Eastern and Southern Berms
Pre-Design Sampling Locations
Engineering Evaluation/Cost Analysis
Non Time Critical Removal Action of
Lagoon and Adjacent Stream Channels
Universal Oil Products
East Rutherford, N.J.
CH2MHILL







- Legend**
- 2011 Pre-Design Event Core Sample Location
 - Previous Investigation Sediment Sample Location
 - Future Remediation Areas
 - UOP Site Boundary

- Notes:**
- Depth intervals and clay depths shown have been corrected based on core penetrations and recoveries.
 - "--" = not sampled
 - Shading indicates "native clay"
 - "J" – estimated value

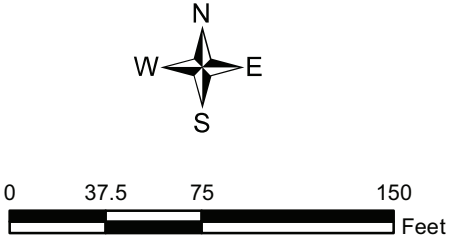
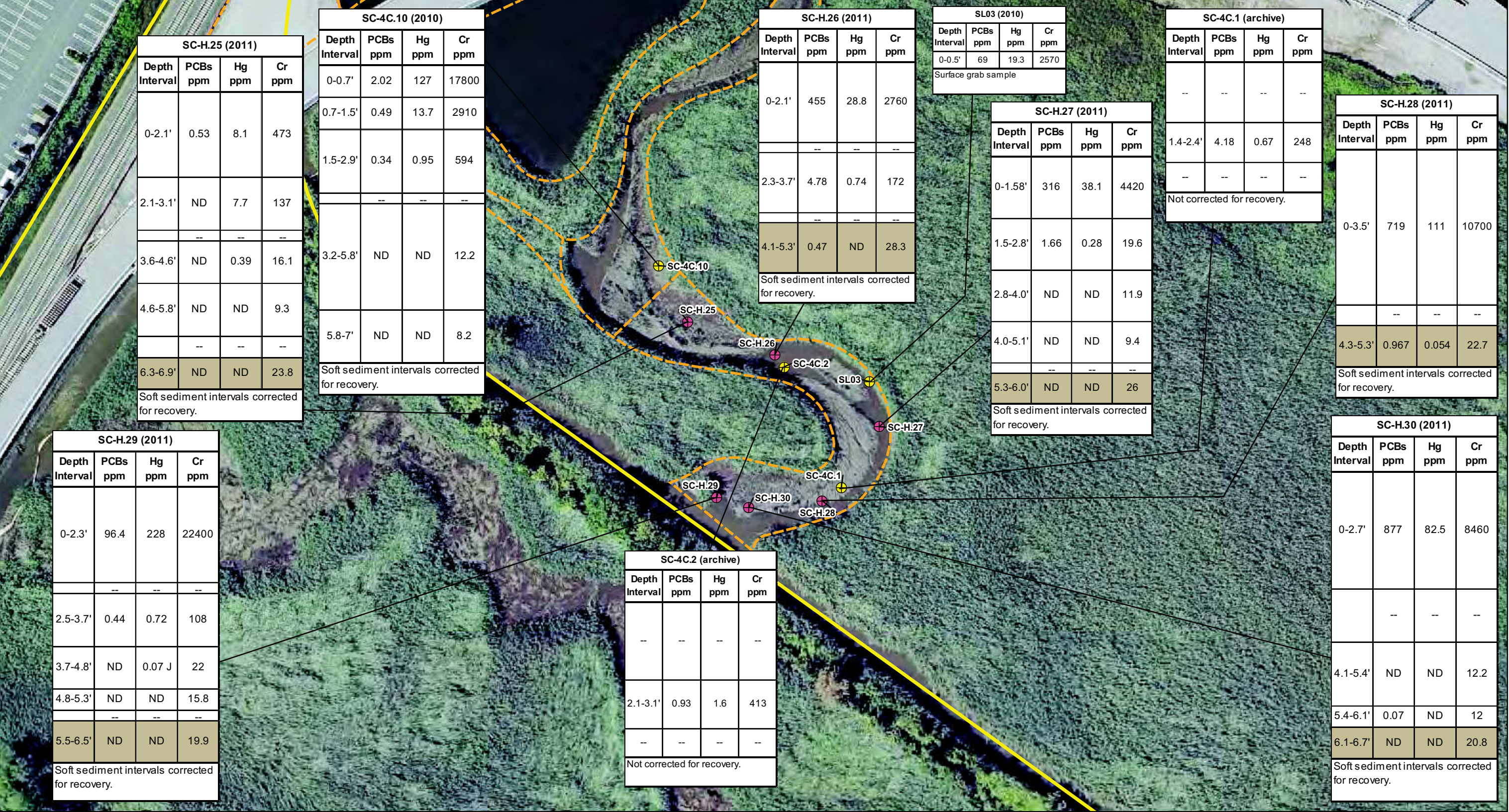


Figure 2-6e
Total PCB, Chromium, and Mercury Concentrations – Eastern Channel
Pre-Design Sampling Locations
Engineering Evaluation/Cost Analysis
Non Time Critical Removal Action of
Lagoon and Adjacent Stream Channels
Universal Oil Products
East Rutherford, N.J.



- Legend**
- 2011 Pre-Design Event Core Sample Location
 - Previous Investigation Sediment Sample Location
 - Future Remediation Areas
 - UOP Site Boundary

- Notes:**
- Depth intervals and clay depths shown have been corrected based on core penetrations and recoveries.
 - ND = non detect
 - "--" = not sampled
 - Shading indicates "native clay"
 - "J" - estimated value

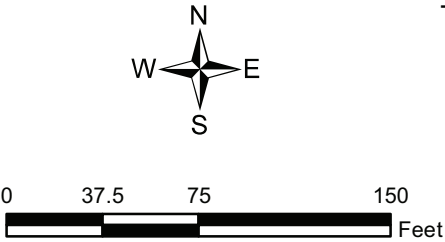
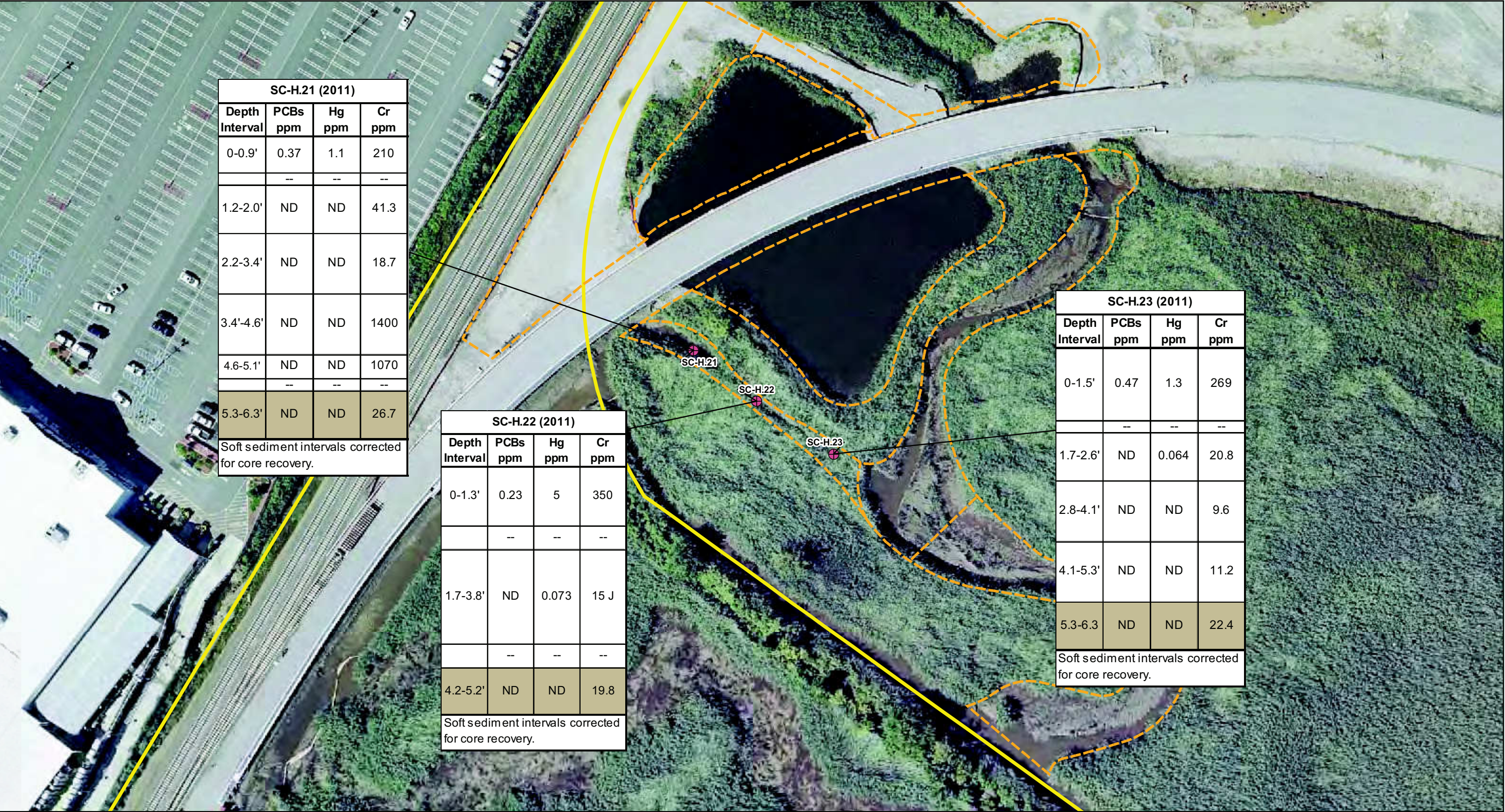


Figure 2-6f
Total PCB, Chromium, and Mercury Concentrations – Eastern Channel Meander
Pre-Design Sampling Locations
Engineering Evaluation/Cost Analysis
Non Time Critical Removal Action of
Lagoon and Adjacent Stream Channels
Universal Oil Products
East Rutherford, N.J.



- Legend**
- 2011 Pre-Design Event Core Sample Location
 - Future Remediation Areas
 - UOP Site Boundary

- Notes:**
1. Depth intervals and clay depths shown have been corrected based on core penetrations and recoveries.
 2. ND = non detect
 3. "-" = not sampled
 4. Shading indicates "native clay"
 5. "J" - estimated value

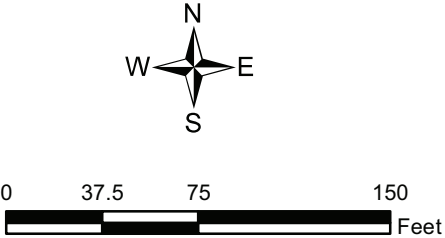


Figure 2-6g
Total PCB, Chromium, and Mercury Concentrations – Southern Ditch
Pre-Design Sampling Locations
Engineering Evaluation/Cost Analysis
Non Time Critical Removal Action of
Lagoon and Adjacent Stream Channels
Universal Oil Products
East Rutherford, N.J.

APPENDIX B

Universal Oil Products Site
Non-Time-Critical Removal Action
Responsiveness Summary
June 14, 2012

Comment 1 - *The community is concerned with flooding near Rt. 17 and Stanley Street – will the tide gate worsen problem by limiting retention.*

Response 1 - The project should not worsen the potential for flooding either during the construction period or after completion of the project. During the construction, the tide gate will allow the same flow on Ackerman's Creek through the conduit under Murray Hill Parkway as currently is found. It would actually lessen the potential for flooding by eliminating tidal flows west of Murray Hill Parkway. After the construction has been completed, the tide gate will be removed. However, the project involves removing the berms around the lagoon, leaving open water. This open water represents an increase in available retention, which would represent a small improvement over current conditions with regard to flooding near Rt. 17.

Comment 2 – *There was a concern expressed that the storm drains along Murray Hill Parkway may become contaminated if water overtops the roadway.*

Response 2 – The probability that flood conditions on the UOP property would overtop Murray Hill Parkway is extremely low. It is EPA's understanding that the high water levels from Hurricane Irene and Tropical Storm Lee did not result in flooding along Murray Hill Parkway in the vicinity of the UOP site. If, in the future, such flooding occurs, then EPA will have to determine whether sampling of storm sewers is necessary.

Comment 3 - *How much of the material will need to be treated as hazardous waste?*

Response 3 – The determination of how much of the excavated sediment/soil/debris has to be treated as hazardous waste will be based on lot- or bin-specific sampling after excavation and dewatering. Approximately 17,000 cubic yards of the excavated material is expected to be handled and disposed of under the Toxic Substances Control Act based on the in-situ PCB concentrations.

Comment 4 - Are we working with the Corps of Engineers on permitting?

Response 4 – Honeywell has been in coordination with the US Army Corps of Engineers for permitting issues under the Corps jurisdiction. Given that this is a CERCLA response action at an NPL site, the Corps considers this to qualify under a nationwide permit and it does not need a specific permit review.

Comment 5 - Is there a plan for mitigation of impacts to wetlands?

Response 5 – The removal action will not fill any wetland areas as part of the response. Minimal areas will get some fill in order to allow truck access, but these areas will be removed at the end of the project. Although this response action occurs within a wetlands area, it was determined through discussions with the Biological and Technical Advisory Group (BTAG) that the creation of more open water in this area may enhance wetlands habitat, and has the potential to offset any required wetlands mitigation.

Comment 6 - Have you considered recent FAA sensitivity to creating bird habitat in flight paths? [the Teterboro Airport flight path is above the site]?

Response 6 – The removal of the lagoon berms will add a small area of open water, but open water areas are present now and that area will not increase substantially. Avian use of the area should not change from existing conditions.

Comment 7 - Does any of the property belong to the New Jersey Sports and Exhibition Authority?

Response 7 – Yes, the property where this removal action will occur belongs to the NJSEA, except for a rail right-of-way which has been transferred to NJ Transit. Honeywell has retained the environmental liability for the property. The NJSEA has been cooperative regarding this cleanup. NJSEA will continue to work with EPA and Honeywell throughout the project to ensure that construction activities do not interfere with use of the rail line to the Meadowlands Stadium during events.

Comment 8 -Are you modeling potential storm surges and flood implications if sea level rises?

Response 8 – As part of the OU2 RI/FS for the site, hydrodynamic modeling has been conducted. The remedy for OU2 will need to account for the implications of sea level rise. This removal will not need to account for sea level rise as the areas excavated will be left as open water. The Berry's Creek RI/FS is also conducting hydrodynamic modeling in the area. The

larger scale of the Berry's Creek Study Area will require consideration of sea level rise in the evaluation of alternatives.

Comment 9 - What happens to existing water?

Response 9 – First, the tide gate construction will eliminate tidal water from entering the site west of Murray Hill Parkway. Pipes will be placed within the existing stream channels to allow storm water flows to bypass the channels. Those pipes will discharge the storm water into Ackerman's Creek. A barrier will be placed at the end of the NTCRA area channels to prevent water from Ackerman's Creek from flowing into the dewatered channels. The existing water in the lagoon is relatively clean. It will be pumped out of the lagoon into Ackerman's Creek. As the water level draws down to approximately the last foot, such that resuspension of sediment might introduce contaminants, it will be pumped to the water treatment plant that is being assembled on site. That water, along with the water from dewatering the other channels, and the excavated sediment, will be discharged after treatment into Ackerman's Creek.

Comment 10 - Will gravity drainage (bypass) stay permanently or be removed?

Response 10 - The conduits for the gravity storm sewer bypass will be removed after excavation is completed.

Comment 11 - Will there be any dredging of Ackerman's Creek? (Dredging would increase retention volume that may alleviate flooding problems.)

Response 11 – No, Ackerman's Creek will not be dredged. These sediments do not typically contain the high concentrations of contaminants that are being addressed in this removal action, nor would they be very susceptible to dispersion and therefore are not included in this action. Of course, the OU2 RI/FS for the site, in conjunction with the RI/FS for the Berry's Creek Study Area, will need to consider whether the sediment in Ackerman's Creek needs to be addressed with respect to the overall cleanup(s).

Comment 12 – A number of emails and telephone calls were received by the EPA Remedial Project Manager during the public comment period. These emails and calls were primarily by vendors that wanted the project to use their product/technology.

Response 12 – As none of these emails or calls presented comments on the Removal Fact Sheet or the EE/CA for the project, no response is necessary. In many cases the names and contact information of the Honeywell representatives were sent to the people who contacted EPA.